



Figure 3d is a depiction of a file metadata interface according to the prior art.

Figure 4 is a schematic illustration of the network of Figure 2, as perceived by a user according to the present invention.

Figure 5 is an interface screen capture of a computerized method according to one embodiment of the present invention.

Figure 5b is an alternate implementation of the screen capture of Figure 5.

Figure 6 is a table demonstrating the use of false identities to achieve optimum application interfaces under various file access scenarios.

Figure 7 is a depiction of the temporal process in the creation of an application link according to an embodiment of the present invention.

Figure 8 is a depiction of the data flows relating to part of the creation of an application link according to one embodiment of the present invention.

Figure 9 is a depiction of the data flows relating to the transmission of an application link according to one embodiment of the present invention.

Figure 10 is a depiction of the process flows relating to part of activation of an application link according to one embodiment of the present invention.

Figure 10b is a depiction of the process flows relating to another part of the activation of an application link according to one embodiment of the present invention.

Figure 11a is a depiction of a screen view relating to the transmission of an application link according to one embodiment of the present invention.

Figure 11b is a depiction of a screen view relating to an alternate manner of transmission of an application link according to one embodiment of the present invention.

~~Figure 11c is a depiction of a user interface screen capture relating to an unavailable link according to an embodiment of the present invention.~~

Figure 12 is a depiction of a process flow relating to the creation of a guest account for access to application link according to one embodiment of the present invention.

Figure 13 is a depiction of process flows relating to the encrypted transmission of an application link according to one embodiment of the present invention.

Figure 14 is a depiction of process flows relating to dynamic changing of file accessed by an application link according to one embodiment of the present invention.

Figure 15 is a depiction of a process flow relating to a file presented as static accessed by an application link according to an embodiment of the present invention.

Figure 16 is a depiction of process flows relating to the control of client capabilities for an application link according to one embodiment of the present invention.

Figure 17 is a depiction of process flows relating to an alternate manner of control of client capabilities for an application link according to one embodiment of the present invention.

Figure 18 is a process flow diagram for a software rights control system according to an embodiment of the present invention.

Figure 19a is a depiction of a user interface for a communication link according to an embodiment of the present invention.

Figure 19b is a depiction of a screen view for an alternate implementation of a communication link according to an embodiment of the present invention.

Figure 20 is a depiction of a process flow, with corresponding user interfaces, for a collaborative communication system according to an embodiment of the present invention.

Figure 21 is a depiction of a process flow for a collaborative communication system according to an embodiment of the present invention.

Figure 22 is a depiction of a process flow for a collaborative communication system according to an embodiment of the present invention.

Figure 23 is a depiction of user interface for an alternate implementation of a communication link according to an embodiment of the present invention.

Figure 24a is a depiction of user interface for an alternate implementation of a communication link according to an embodiment of the present invention.

Figure 24b is a depiction of an alternate implementation of a user interface for a communication link according to an embodiment of the present invention.

~~Figure 25 is a depiction of a user interface for a collaborative communication link according to an embodiment of the present invention.~~

~~Figure 26 is a depiction of a user interface for an alternate embodiment of the present invention.~~

Figure 25 is a depiction of a notification email.

Figure 26 is a depiction of a user interface for managing the application links of the present invention.

Figure 27 is a process flow diagram for an e-mail server according to a further embodiment of the present invention.

Figure 28 is a process flow diagram depicting the creation of an application-file link interface according to one embodiment of the present invention.

Figure 29 is a process flow diagram depicting the opening of an application/file hyperlink in the sender's online file system, according to one embodiment of the present invention.

Figure 30 is a process flow diagram depicting the setting of application/file hyperlink properties, according to one embodiment of the present invention.

Figure 30a is a process flow diagram depicting the setting of further application/file hyperlink properties, according to one embodiment of the present invention.

Figure 30b is a process flow diagram depicting the setting of further application/file hyperlink properties, according to one embodiment of the present invention.

Figure 30c is a process flow diagram depicting the setting of further application/file hyperlink properties, according to one embodiment of the present invention.

Figure 31 is a process flow diagram depicting the implementation of application/file hyperlink recipient properties by online application variables, according to one embodiment of the present invention.

Figure 32 is a process flow diagram depicting the notification to an application/file hyperlink creator or sender that the link has been activated , according to one embodiment of the present invention.

Figure 33 is a depiction of an existing html-based web portal home page, and an alternative to that page, according to one embodiment of the present invention.

Figure 34 is a depiction of a user interface according to an embodiment of the present invention.

Figure 35 is a depiction of a further user interface according to an embodiment of the present invention.

Figure 36 is a depiction of another user interface according to an embodiment of the present invention.

~~Figure 37 is a depiction of a user interface according to the present invention.~~

~~Figure 38 is a depiction of a SMTP message that may be issued by a system implemented according to the present invention.~~

file-compatible application, and open the file in the application at 1026. The recipient will interact at 1028 with the file through the application user interface, as presented graphically to the recipient by the thin client executable.

The AppLink may be terminated in several ways at 1030. For example, as mentioned, automatic termination criteria could have been established by the AppLink creator, such as a specified duration. The AppLink could be deactivated by the creator at any time, or the AppLinked file could be moved, deleted, or destroyed. Following termination, a recipient clicking on an inactive AppLink may, according to the preferences of the creator, be presented with an explanatory “AppLink Not Active” message, ~~Figure 11e~~, perhaps giving reasons or expiration information if specified or authorized by the creator, rather than an unadorned 404 or similarly uninformative error.

Figure 11a is a depiction of a screen view relating to the transmission of an application link according to one embodiment of the present invention. Figure 11b is a depiction of a screen view relating to an alternate manner of transmission of an application link according to one embodiment of the present invention. In a preferred embodiment, a system is provided for managing and tracking the accesses to an AppLink. For example, a log of AppLink access data could be kept by the AppLink server. This may preferably be reviewed by the creator at any time, or made available according to the subscription level of the creator.

Preferably, a system according to the present invention may provide an interface to change an AppLink’s permissions at any time after creation, for example, by extending a “drop-dead” time. Figure 36 is a depiction of a user interface screen capture relating to an unavailable link according to an embodiment of the present invention.

Following termination, a recipient clicking on an inactive AppLink may, according to the preferences of the creator, be presented with an explanatory “AppLink Not Active” message as depicted in Figure 36, perhaps giving reasons or expiration information if specified or authorized by the creator, rather than an unadorned 404 or similarly uninformative error.

Figure 12 is a depiction of a process flow relating to the creation of a guest account for access to application link according to one embodiment of the present invention. As depicted in Figure 12, the recipient of an AppLink will preferably be granted access to a temporary guest account created upon execution of the AppLink at 1212, following AppLink execution 1210. Alternatively, multiple guest account may be created in advance and assigned to specific

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Various user interfaces may be used in implementing embodiments of the present invention; however, several suitable user interfaces are described herein. Figure 34 44 depicts a suitable user interface 4410 serving as a confirmation screen so that the sender of an AppLink may ensure the parameters of the AppLink are as intended. The sender may then execute a GUI button 4412 to mail the AppLink, edit the parameters 4414, or cancel the AppLink 4416.

A suitable GUI interface for the receiver of an AppLink is depicted in Figure 35 at 4510. The user may enter a password in the text box, download the document if permitted via a link, and observe information about the file that is the subject of the AppLink. Various informational links may also be provided for general information. However, if a recipient tries to access an AppLink that has expired or otherwise terminated, they may be presented with informational GUI depicted in Figure 36, which may also serve as an informational source about the invention by way of links. If the AppLink is successfully accessed by the recipient, the sender of the AppLink may be notified by SMTP message as depicted in Figure 37 25, or by other communication as detailed above.

An AppLink sender may be provided with a GUI interface or other suitable interface as depicted in Figure 38 26 giving a comprehensive list of all AppLinks which the sender is currently administering or are active or pending. The status of the particular AppLinks may be shown. The sender may execute check boxes or otherwise indicate if any files are to be manually deleted prior to their automatic expiration.

While a preferred embodiment of the present invention has been described, it should be understood that various changes, adaptations and modifications may be made therein without departing from the spirit of the invention and the scope of the appended claims.



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Figure 15 is a depiction of a process flow relating to a file presented as static accessed by an application link according to an embodiment of the present invention.

Figure 16 is a depiction of process flows relating to the control of client capabilities for an application link according to one embodiment of the present invention.

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Figure 18 is a process flow diagram for a software rights control system according to an embodiment of the present invention.

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Figure 33 is a depiction of an existing html-based web portal home page, and an alternative to that page, according to one embodiment of the present invention.

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Figure 35 is a depiction of a further user interface according to an embodiment of the present invention.

Figure 36 is a depiction of another user interface according to an embodiment of the present invention.

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The AppLink may be terminated in several ways at 1030. For example, as mentioned, automatic termination criteria could have been established by the AppLink creator, such as a specified duration. The AppLink could be deactivated by the creator at any time, or the AppLinked file could be moved, deleted, or destroyed. Following termination, a recipient clicking on an inactive AppLink may, according to the preferences of the creator, be presented with an explanatory “AppLink Not Active” message, perhaps giving reasons or expiration information if specified or authorized by the creator, rather than an unadorned 404 or similarly uninformative error.

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Figure 12 is a depiction of a process flow relating to the creation of a guest account for access to application link according to one embodiment of the present invention. As depicted in Figure 12, the recipient of an AppLink will preferably be granted access to a temporary guest account created upon execution of the AppLink at 1212, following AppLink execution 1210. Alternatively, multiple guest account may be created in advance and assigned to specific

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